AYURVEDIC MANAGEMENT OF RETINITIS PIGMENTOSA: A CASE REPORT

Anuja Singh V.¹, Sumithra T Gowda.²

¹Post Graduate Scholar, ²Professor & HOD, Department of ShalakyaTantra
Government Ayurvedic Medical College
Bengaluru, Karnataka, India

Email: anuja.singh.v@gmail.com

ABSTRACT

Retinitis Pigmentosa (RP) or pigmentary retinal dystrophy is a hereditary disorder predominantly affecting the rods more than the cones. It is a most common hereditary fundus disorder, with a prevalence of approximately 1:5000. The clinical features of retinitis pigmentosa can be correlated to kaphavidaghadristi. A 33 year old female patient with a prior diagnosis of RP was admitted in SJIIM hospital, Bangalore. She was treated with Shiroudwartana followed by Shiroabyanga, Nasya, Tailadhara, Tarpana, Putapaka and punarnavaswarasapana. There was improvement in visual acuity and the patient was able to perceive the objects clearer than before, since there is no treatment in contemporary science to reverse the damage caused by RP. Hence here an approach is made to improve the eyesight by slowing down the progression of disease with the help of various treatment modalities.

Keywords: Retinitis pigmentosa, Kaphavidaghadristi, Nasya, Tailadhara, punarnavaswarasapana

INTRODUCTION

Retinitis Pigmentosa (RP) is a slow, degenerative disease of the retina, almost invariably occurring in both eyes, beginning in the childhood and often resulting in blindness in middle or advanced age. The degeneration primarily affects the rods and cones, particularly the former and commences in a zone near the equator of the eye gradually spreading both anteriorly and posteriorly. The macula region is not affected until a late stage¹. RP may occur as - a) Sporadic disorder – without family history due to the mutation of rhodopsin gene (38%) , b) Inherited disorder – Autosomal recessive (25%), Autosomal dominant (20%), X – linked (9%) , c) Undetermined inheritance (8%). Males are more
commonly affected than females in a ratio of 3:2.

The visual symptoms include night blindness which is the characteristic feature and may be present several years before the visible changes in retina appear, dark adaptation and tubular vision. The fundus changes includes retinal pigmentary changes – these are typically perivascular and resemble in bony corpuscles in shape, retinal arterioles are attenuated (narrowed), optic disc is pale and waxy². The visual field changes show annular or ring shaped scotoma is a typical feature which corresponds to the degenerated equatorial zone of retina. As the disease progresses, scotoma increases anteriorly and posteriorly and ultimately only central vision is left (tubular vision). Eventually this is also lost and patient becomes blind².

The main feature of RP is night blindness. Night blindness is seen in doshandha, kaphavidagdha, ushnavidagdha, nakulandya and hrisswajadya. The line of treatment involves to improve the acuteness of alochaka pitta by providing sneha, tikshna, ushna, laghu, visra, saragunadravyas and to normalise the function of vataby vatahara and rasayana measures³.

CASE REPORT:
Chief complaints:
Diminished vision at night time Since childhood
Blurred vision during day time
Headache since 6 months.

History of present illness:
A 33 year old female patient came to Shalakya OPD of Government Ayurvedic Medical college, Bengaluru on 4th April 2016 with complains of difficulty in seeing at night time since childhood. Later she gradually developed blurred vision during day time. When she approached an ophthalmologist, she was diagnosed with Retinitis pigmentosa. The patient developed headache since 6 months. Hence for the same she was admitted to the hospital on 4th April 2016.

Past History:
No history of trauma or infectious disease.

Family History:
History of consanguineous marriage.
Patient sister – also diagnosed with RP.

Personal History:
Appetite: Good
Sleep: Disturbed
Bowel: Regular
Micturition: 5-6 times

Treatment History:
Nothing significant

General Examination:
CNS: Consciousness, higher mental functions intact
CVS: S₁ S₂ heard.
Loco motor system: Normal
Eye Examination:
Anterior Segment: Normal
IOP: Normal
Retina: Fundus Examination - Bony corpuscles, attenuated vessels and pale optic disc seen in both the eyes.

Visual Acuity:
**Table 1:** Showing Visual Acuity before treatment

<table>
<thead>
<tr>
<th>Before Treatment</th>
<th>DV (without spectacles)</th>
<th>NV (without spectacles)</th>
<th>PH</th>
</tr>
</thead>
<tbody>
<tr>
<td>OD</td>
<td>4/60</td>
<td>N&lt;sub&gt;36&lt;/sub&gt;</td>
<td>6/9</td>
</tr>
<tr>
<td>OS</td>
<td>6/36p</td>
<td>N&lt;sub&gt;36&lt;/sub&gt;</td>
<td>6/18</td>
</tr>
</tbody>
</table>


**TREATMENT PROTOCOL:**
- *Rasna Choorna Shiro Udvardana*<sup>4</sup> for 10-15 mins followed by *Shiro Abyanga*<sup>2</sup> with *ksheerabala Taila* for 10-15 min – 5 days.
- *Nasya* with *Anu Taila*<sup>6</sup> – 5 days.
- *Vishramakala* for one day was advised.
- *Tailadhara* with *Ksheerabala Taila*<sup>7</sup> – 5 days followed by

- **Tarpana** with *patoladi Ghrita*<sup>8</sup> – 5 days followed by
- **Putapaka**<sup>9</sup> – 2 days
- Internally *Punarnava Swarasa*<sup>10</sup> – 15ml empty stomach morning was advised.

**OBSERVATION AND RESULTS:**
After complete treatment Visual Acuity:

**Table 2:** Showing Visual Acuity after treatment

<table>
<thead>
<tr>
<th>After Treatment</th>
<th>DV (without spectacles)</th>
<th>NV (without spectacles)</th>
<th>PH</th>
</tr>
</thead>
<tbody>
<tr>
<td>OD</td>
<td>5/60</td>
<td>N&lt;sub&gt;18&lt;/sub&gt;</td>
<td>6/9</td>
</tr>
<tr>
<td>OS</td>
<td>6/36</td>
<td>N&lt;sub&gt;36&lt;/sub&gt;</td>
<td>6/18</td>
</tr>
</tbody>
</table>


**FOLLOW UP:**
*Patoladi Ghrita* 1tsf – 0 – 1tsf with warm milk was advised.

**DISCUSSION**
- *Shiroudvartana* helps in alleviating *kaphadosha*. *Rasnadi choorna* mainly contains drugs with *chakshushya* and *kaphahara* property. It improves blood circulation and enhances the drug absorption.
- *ShiroAbyanga* helps in *indriyatarpana* (nourishes the sense organs) and improves the vision.
- *Nasya* with *anutaaila* helps in cleansing of *srotas* and prevent the accumulation of *kaphadosha* and thus nourishes the eye.
- *Shirodhara* with *Ksheerabalataila*. *Dhara* produces a constant pressure and vibration which is amplified by hollow sinus present in the frontal bone. The penetration is through the follicular pores to the follicles and then to the dermis via sebaceous glands. It normalizes the function of thalamus and forebrain which brings the amount of serotonin and catecolamines. It stimulates pineal gland which produces the hormone melatonin which regulates the wake and sleep cycle<sup>11</sup>.
- **Tarpana** with *patoladighrita* which is indicated in *timira* and *naktandya*. *Ghrita* possess the quality to penetrate to deeper channels in the body. In *tarpana* the tissue contact time and bioavailability is more. The lipophilic nature of *ghrita* helps to reach to the target organ and finally reaches the cell because of presence of lipids in cell membrane.
• **Putapaka** helps to facilitate the absorption of ghrita after tarpana.
• **Punarnava** (*Boerhaaviadiffusa Linn.*) swarasa internally - fresh juice of whole plant was administered daily. It is *tridoshahara* and acts as *rasayana*. It contains flavonoids, alkaloids, glycoproteins. It has antioxidant, immunomodulator and anti-inflammatory activity. It is mentioned as *pathya* in *netraroga*.

**CONCLUSION**

The treatment protocol aims at slowing down the disease process with drugs having *Chakshushyaproperty and indicated in Naktandya*. There was significant improvement in subjective symptoms and thereby improving the quality of life in patient.

**REFERENCES**


**Source of Support:** Nil

**Conflict Of Interest:** None Declared